

The following are questions posed by the Wyoming Outdoor Council following their outreach session on February 20, 2018, and answers provided to the WOC by the Solid and Hazardous Waste Division on March 8, 2018:

1. How many operators in WY meet the requirements necessitating the submittal of a Hazardous Waste manifest?

The DEQ estimates there are approximately 65 entities routinely required to ship wastes with a Hazardous Waste manifest. This number can and does change from year to year because a facility may only be what is termed an "episodic" generator of hazardous wastes, meaning in some years they may not generate quantities of waste requiring a manifest. DEQ should clarify all of such facilities have typically still used manifests whether or not they were required to do so in a given year.

Does the HWD receive a copy of these manifests and if so, will the HWD receive a copy of the e-manifest?

DEQ regulations do not require facilities send paper copies of manifests to DEQ but we do receive copies from some generators.

2. Are the questions asked in the e-manifest form different than the current manifest reporting forms?

With the e-manifest being optional for the time being, they will not differ significantly from paper manifests. The only real difference would be they are signed "electronically" and can be electronically/digitally managed in various forms, including .pdf formats for emailing, printing, etc.

Coal Combustion residuals:

1. What is a coal combustion residual

As defined by the US EPA, "Coal Combustion Residuals (CCRs) means fly ash, bottom ash, boiler slag, and flue gas desulfurization materials destined for disposal. CCRs are also known as coal combustion wastes (CCWs) and fossil fuel combustion (FFC) wastes, when destined for disposal." We don't specifically define CCR in our Wyoming Solid Waste Rules, but this EPA definition is consistent with our current regulatory approach.

and what type of disposal is required by the current rules?

Currently in Wyoming, the Department of Environmental Quality (DEQ) Solid Waste Permitting and Corrective Action Program regulates landfills for the disposal of coal combustion byproducts/coal ash under Chapter 3, "Industrial Landfill Regulations" of the Solid Waste Rules and Regulations. The Wyoming DEQ Water Quality Division regulates surface impoundments under Chapter 11 of the Water Quality Rules and Regulations.

2. How often have the existing disposal of coal combustion residual rules been applied?

All CCR landfills and surface impoundments in Wyoming are currently permitted by DEQ under our current regulations. New rules for the Disposal of Coal Combustion Residuals from Electric Utilities were published in the Federal Register on April 17, 2015. These new rules were published under the Subtitle D (solid waste regulations) of the Resource Conservation and Recovery Act (RCRA) in 40 CFR Parts 257 and 261, rather than under the Subtitle C (hazardous waste) regulations.

Congress passed and the President signed the Water Infrastructure Improvements for the Nation (WIIN) Act in 2016. Section 2301 of the Act amends Section 4005 of the Resource Conservation and Recovery Act (RCRA)

to provide for state CCR permit programs. The WIIN Act gives EPA the authority to review and approve state CCR permit programs.

Wyoming has just started working internally on our own CCR rules that we plan to eventually submit to the EPA for approval per the provisions in the WIIN Act. The WINN Act directs EPA to approve any State program that requires each coal combustion residuals unit located in the State to achieve compliance with either: (1) the Federal CCR requirements at 40 CFR part 257; or (2) other State criteria that the Administrator, after consultation with the State, determines to be at least as protective as the Federal requirements. Our rulemaking will include public notice of informal outreach followed by formal rulemaking through the Wyoming Water and Waste Advisory Board and the Wyoming Environmental Quality Council. We anticipate working with the EPA during our rulemaking process, but we will eventually need to submit our final rule to the EPA for their review under the provisions of the WIIN Act.

For more information on CCR regulation, refer to <https://www.epa.gov/coalash/coal-ash-rule>.

In what way are the proposed rules going to be less stringent?

The State, by federal mandate, cannot be less stringent than the federal EPA rules. The existing Wyoming hazardous waste rules, if not revised, would be more stringent than the EPA rule, because the EPA rule excludes from the definition of hazardous waste the wastes generated primarily from processes that support the combustion of coal or other fossil fuels when these wastes are co-disposed with CCR. These are the wastes listed in 261.4(b)(4)(ii). See <https://www.epa.gov/rcra/state-authorization-rule-checklists-233-through-235-hazardous-waste-rulemakings-published#235> and <https://www.law.cornell.edu/cfr/text/40/261.4>

3. Does the EQA provide for WY to enforce hazardous waste rules that are more stringent than the EPA equivalent rule?

Yes, the State can be more stringent than the Federal EPA rules under the Environmental Quality Act (EQA).

Hazardous Waste Labeling-

1. Will the permissible use of three different labeling systems (NFPA, USDOT or OSHA) create confusion with the public or occasional users of hazardous waste labeling/placarding?

The labeling changes in the hazardous waste generator improvements rule include minimum standards such as clearly labeling all containers as hazardous waste. The hazards labeling part of the generator improvements rule allows for the general hazard to be labeled using pictorial labels under either NFPA, USDOT, or OSHA. According to the EPA in the federal register, EPA proposed that Treatment Storage and Disposal Facilities (TSDFs) storing hazardous wastes in containers mark their containers with the following: (1) The words "Hazardous Waste"; (2) other words that identify the contents of the containers, with examples that may include, but are not limited to, the name of the chemical(s), or, as applicable, the proper shipping name and technical name markings used to comply with DOT requirements at 49 CFR part 172 subpart D; and (3) an indication of the hazards of the contents of the container. The Agency also proposed that containers must be labeled with the applicable EPA hazardous waste number(s) (EPA hazardous waste codes). See checklist and federal register at <https://www.epa.gov/rcra/state-authorization-rule-checklists-233-through-235-hazardous-waste-rulemakings-published#237>.

Miscellaneous

1. What exactly does "vacatur of comparable fuel rules and gasification" mean?

Vacatur of comparable fuel and gasification is the title EPA has given to one rule which will remove two previous rules. The removal of these two rules ensures that hazardous waste in these processes remain subject to RCRA regulations as hazardous wastes. See EPA Checklist 234, summary and federal register at

<https://www.epa.gov/rcra/state-authorization-rule-checklists-233-through-235-hazardous-waste-rulemakings-published#234>

2. Why are some wastes generated from coal or fossil fuels no longer hazardous because they are being co-disposed?

CCR has historically not been considered to be a hazardous waste. After much debate, the EPA decided to regulate CCR under RCRA Subtitle D solid (non-hazardous) waste rules. As noted above, the EPA rule excludes from the definition of hazardous waste the wastes generated primarily from processes that support the combustion of coal or other fossil fuels when these wastes are co-disposed with CCR. These are the wastes listed in 261.4(b)(4)(ii). See <https://www.epa.gov/rcra/state-authorization-rule-checklists-233-through-235-hazardous-waste-rulemakings-published#235> and <https://www.law.cornell.edu/cfr/text/40/261.4>

Are these materials disposed in the same manner as coal combustion residuals?

Yes. The EPA rule excludes the waste listed in 261.4(b)(4)(ii) when these wastes are co-disposed with CCR in a facility regulated under the EPA Subtitle D CCR rule

To clarify, the comparable fuels and gasification rules do not pertain to CCR disposal in a Subtitle D landfill. Comparable fuels are burned as fuel and as Subtitle C regulated waste, and are not disposed of in a Subtitle D landfill. Gasification is the burning of oil-bearing secondary materials inserted into a gasification unit at a petroleum refinery to produce synthesis gas.

3. What is a cathode ray tube? <https://archive.epa.gov/epawaste/hazard/web/html/index-27.html>

A cathode ray tube (CRT) is the glass video display component of an electronic device (usually a computer or television monitor). CRT funnel glass generally contains high enough concentrations of lead that the glass is regulated as hazardous waste when disposed. See EPA article at <https://archive.epa.gov/epawaste/hazard/web/html/index-27.html>

4. What are the overall environmental effects associated with the implementation of the new rules?

Some positive environmental effects/improvements that would be expected for each rule include the following:

RULE TO BE ADOPTED	EPA SUMMARY OF BENEFITS
<p><u>Hazardous Waste Electronic Manifest</u></p> <p>For more information see: https://www.epa.gov/e-manifest/learn-about-hazardous-waste-electronic-manifest-system-e-manifest</p>	<p>Cost savings;</p> <p>Accurate timely information on shipments;</p> <p>Rapid notification of discrepancies or problems;</p> <p>One-stop reporting of manifest data;</p> <p>Increased effectiveness of compliance;</p> <p>Potential to integrate manifest reporting with Resource Conservation and Recovery Act (RCRA) biennial reporting.</p>

<p><u>Export Provisions of the Cathode Ray Tube (CRT)</u></p> <p>For more information see: https://www.epa.gov/hw/final-rule-revisions-export-provisions-cathode-ray-tube-crt-rule</p>	<p>Reduce harm from U.S. exports of e-waste</p> <p>Ensure the safe handling of used electronics in developing countries</p> <p>Better track exports of CRTs for reuse and recycling</p>
<p>RULE TO BE ADOPTED</p>	<p>EPA SUMMARY OF BENEFITS</p>
<p><u>Vacatur of Comparable Fuel and Gasification rules</u></p> <p>For more information see:</p> <p>https://www.federalregister.gov/documents/2015/04/08/2015-07992/response-to-vacatur-of-the-comparable-fuels-rule-and-the-gasification-rule</p>	<p>Removes two rules that were contradictory with other rules</p> <p>Ensures that hazardous waste in these processes remain subject to RCRA regulations as hazardous wastes</p>
<p><u>Disposal of Coal Combustion Residuals from Electric Utilities</u></p> <p>For more information see:</p> <p>https://www.epa.gov/coalash/frequent-questions-about-coal-ash-disposal-rule</p>	<p>Protects groundwater, surface water from contamination</p> <p>Protects communities from surface impoundment failure</p> <p>Protects against fugitive dust emissions</p> <p>Supports the responsible recycling of coal ash</p>
<p><u>Imports and Exports of Hazardous Waste</u></p> <p>For more information see:</p> <p>https://www.epa.gov/hwgenerators/frequent-questions-about-hazardous-waste-export-import-revisions-final-rule</p>	<p>Provides greater protection to human health and the environment by providing increased transparency</p> <p>Increased data sharing</p> <p>More efficient compliance monitoring</p> <p>Consolidate and streamline some requirements</p> <p>Increased tracking of transportation and disposition of individual imported and exported shipments</p> <p>Consolidate regulation with foreign governments</p>

<p><u>Hazardous Waste Generator Rule Improvements</u></p> <p>For more information:</p> <p>https://www.epa.gov/hwgenerators/fact-sheet-about-hazardous-waste-generator-improvements-final-rule</p>	<p>Eliminates obsolete references</p> <p>Streamlines rules by generator size</p> <p>Allows provisions for episodic generation</p> <p>Easier to understand</p> <p>Increased flexibility in labeling requirements</p> <p>Alternative handling options</p> <p>Improves risk communication</p>
<p>RULE TO BE ADOPTED</p>	<p>EPA SUMMARY OF BENEFITS</p>
<p><u>Hazardous Waste Management System: User Fees for the Electronic Manifest System and Amendments to Manifest Regulation</u></p> <p>For more information see: https://www.epa.gov/e-manifest/frequent-questions-about-final-rule-user-fees-electronic-hazardous-waste-manifest-system</p>	<p>Reduces use of paper manifest forms</p> <p>Provides for incentive to move from paper to electronic (Higher fees for paper manifests)</p>
<p><u>Confidentiality Determination for Hazardous Waste Export and Import Documents</u></p> <p>For more information see:</p> <p>https://www.epa.gov/hwgenerators/frequent-questions-about-confidentiality-determinations-hazardous-waste-export-and</p>	<p>Cost-savings</p> <p>Greater efficiency to both the regulated community and EPA</p> <p>Greater transparency with respect to the documents that are within the scope of this rulemaking.</p>